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## **ABSTRACT**

Techniques are disclosed for addressing the name space mismatch between content servers (which use Uniform Resource Locators, or "URLs") and content caching systems (which use file and path names). A file name-to-URL mapping is created for use by content caching systems, and data in protocol response messages (and optionally in protocol request messages) is augmented to transmit information for use in creating this mapping, enabling a content caching system to automatically and dynamically populate its file name-to-URL mapping. By having the file name available, the caching system can now respond to content management messages which identify the cached content by only the content's associated file name. Techniques for encoding the message extensions include: use of new directives on existing cache-control headers in Hypertext Transfer Protocol ("HTTP") messages; addition of new headers in HTTP messages; and use of meta-data in markup languages such as Hypertext Markup Language ("HTML") or Extensible Markup Language ("XML") format.